ABC LABORATORIES, INC. **EAST 4922 UNION AVENUE** SPOKANE, WA 99212 509-534-0161

REPORT TO: Keytronic Corporation P.O. Box 14687 Spokane, WA 99214

LAB NO:31797-88 DATE:9-20-88 DATE REC'D:

ATTN: Bruce Austin

AUGUST 1988 RESULTS

DESCRIPTION: Perform Volatile Organic Scan on 23 submitted samples from the Colbert

Landfill area.

DETECTION LIMITS: 1 part per billion

ND: Not Detected

IS: Internal Standard

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Superfund Pranch

Keytronic Corporation

Lab NO. 31797-88

Euc No. 317 77 GG	(1) (0)					
Name	(b) (6)					Colbert
						Elem. Sch.
WELL NO	1570V 0	15500 4		405011	445.4	
WELL NO.	1573K-3	1573R-1	0273 J-1	1073M-1	10730-1	2673M-1
aaa Trifluorotoluene	IS	IS	IS	IS	IS	IS
Chloroform	ND	ND	ND	ND	ND	ND
1. 1. Dichloroethane	ND	ND	ND	ND	ND	ND
1. 1. Dichloroethylene	ND	ND	ND	ND	ND	ND
Trichloroethylene	ND	ND	ND	ND	ИD	ND
1, 1, 1, Trichloroethane	ND	ND	ND	ND	ND	ND
Tetrachloroothylone	ND	ND	ND	ND	ND	ND
Methylene Chloride	ND	ND	ND	ND	ND	ND
1-Pentene	ND	ND	ND	ND	ND	ND
Cyclopentane	ND	ND	ND	ND	ND	ND
Trans 2 Hexene	ND	ND	ND	ND	ND	ND
Benzene Teluana	ND	ND	ND	ND	ND	ND
Toluene	ND	ND	ND	ND	ND	ND
Ethylene DiBromide	ND	ND	ND	ND	ND	ND
Ethly Benzene M-xylene	ND ND	ND	ND	ND	ND	ND
0-xylene	ND ND	ND	ND	ND	ND	ND
P-xylene	ND	ND ND	ND	ND	ND	ND
Cumene	ND	ND ND	ND ND	ND ND	ND ND	ND
1.2.4 Trimethyl Benzene	ND	ND	ND	ND ND	ND ND	ND ND
P-cymene	ND	ND	ND	ND ND	ND ND	ND ND
Chlorobenzene	ND	ND	ND	ND	ND	ND
M-dichlorobenzene	ND	ND	ND	ND	ND	ND
0-dichlorobenzene	ND	ND	ND	ND	ND	ND
P-dichlorobenzene	ND	ND	ND	ND	ND	ND
Methyl Ethyl Ketone	ND	ND	ND	ND	ND	ND
Acetone	ND	ND	ND	ND	ND	ND
Bromodichloromethane	ND	ND	ND	ND	ND	ND
Bromoform	ND	ND	ND	ND	ND	ND
Carbon Tetrachloride	ND	ND	ND	ND	ND	ND
Dibromochloromethane	ND	ND	ND	ND	ND	ND
1, 2, Dichloroethane	ND	ND	ND	ND	ND	ND
Trans 1,2, Dichloroethane	ND	ND	ND	ND	ND	ND
Trans 1, 2, Dichloroethylene	ND	ND	ND	ND	ND	ND
1. 2. Dichloropropane	ND	ND	ND	ND	ND	ND
Cis 1, 3, Dichloropropane	ND	ND	ND	ND	ND	ND
Trans 1, 3, Dichloropropylene		ND	ND	ND	ND	ND
1, 1, 2, 2, Tetrachloroethane	ND	ND	ND	ND	ND	ND
1, 1, 2, Trichloroethane	ND	ND	ND	ND	ND	ND
2. Chloroethylvinyl Ether	ND	ND	ND	ND	ND	ND

Keytronic Corporation

Lab NO. 31797-88

Name

(b) (6)

Name	, , ,					
WELL NO.	2273F-1	1673H-2	2273K-1	1573C-6	1573B-5	1473D-2
aaa Trifluorotoluene	IS	IS	IS	IS	IS	IS
Chloroform	ND	ND	ND	ND	ND	ND
1, 1, Dichloroethane	ND	ND	ND	ND	ND	ND
1, 1, Dichloroethylene	ND	ND	ND	ND	ND	ND
Trichloroethylene	ND	ND	ND	ND	ND	ND
1, 1, 1, Trichloroethane	ND	ND	ND	ND	6	ND
Tetrachloroethylene	ND	ND	ND	ND	ND	ND
Methylene Chloride	ND	ND	ND	ND	ND	ND
1-Pentene	ND	ND	ND	ND	ND	ND
Cyclopentane	ND	ND	ND	ND	ND	ND
Trans 2 Hexene	ND	ND	ND	ND	ND	ND
Benzene	ND	ND	ND	ND	ND	ND
Toluene	ND	ND	ND	ND	ND	ND
Ethylene DiBromide	ND	ND	ND	ND	ND	ND
Ethly Benzene	ND	ND	ND	ND	ND	ND
M-xylene	ND	ND	ND	ND	ND	ND
0-xylene	ND	ND	ND	ND	NĎ	ND
P-xylene	ND	ND	ND	ND	ND ND	ND
Cumene	ND	ND	ND	ND	ND	ND
1,2,4 Trimethyl Benzene	ND	ND	ND	ND	ND	ND
P-cymene	ND	ND	ND	ND	ND	ND
Chlorobenzene	ND	ND	ND	ND	ND	ND
M-dichlorobenzene	ND	ND	ND	ND	ND	ND
O-dichlorobenzene	ND ND	ND ND	ND ND	ND	ND	ND
P-dichlorobenzene	ND ND	ND ND	ND ND	ND ND	ND	ND
Methyl Ethyl Ketone Acetone	ND ND	ND ND	ND ND	ND ND	ND ND	ND ND
Bromodichloromethane	ND	ND	ND ND	ND	ND	ND
Bromoform	ND	ND	ND	ND	ND	ND
Carbon Tetrachloride	ND	ND	ND	ND	ND	ND
Dibromochloromethane	ND	ND	ND	ND	ND	ND
1, 2, Dichloroethane	ND	ND	ND	ND	ND	ND
Trans 1,2, Dichloroethane	ND	ND	ND	ND	ND	ND
Trans 1, 2, Dichloroethylene		ND	ND	ND	ND	ND
1, 2, Dichloropropane	ND	ND	ND	ND	ND	ND
Cis 1, 3, Dichloropropane	ND	ND	ND	ND	ND	ND
Trans 1, 3, Dichloropropylen		ND	ND	ND	ND	ND
1, 1, 2, 2, Tetrachloroethane	ND	ND	ND	ND	ND	ND
1, 1, 2, Trichloroethane	ND	ND	ND	ND	ND	ND
2. Chloroethylvinyl Ether	ND	ND	ND	ND	ND	ND
		_	_			

Keytronic Corporation

Lab NO. 31797-88	(b) (6)					
Name	(b) (6)					
Name						
WELL NO.	1473N-1	0373A-4	0273E-2	1573C-2	1573B-2	15730-1
aaa Trifluorotoluene	IS	IS	IS	IS	IS	İS
Chloroform	ND	ND	ND	ND	ND	ND
1. 1. Dichloroethane	ND	ND	ND	ND	1	ND
1, 1, Dichloroethylene	ND	ND	ND	ND	4	ND
Trichloroethylene	ND	ND	ND	ND	ND	ND
1, 1, 1, Trichloroethane		ND	ND	ND	132	ND
Tetrachloroethylene	ND	ND	ND	ND	ND	ND
Methylene Chloride	ND	ND	ND	ND	ND	ND
1-Pentene	ND	ND	ND	ND	ND	ND
Cyclopentane	ND	ND	ND	ND	ND	ND
Trans 2 Hexene	ND	ND	NĎ	ND	ND	ND
Benzene	ND	ND	ND	ND	ND	ND
Toluene	ND	ND	ND	ND	ND	ND
Ethylene DiBromide	ND	ND	ND	ND	ND	ND
Ethly Benzene	ND	ND	ND	ND	ND	ND
M-xylene	ND	ND	ND	ND	ND	ND
0-xylene	ND	ND	ND	ND	ND	ND
P-xylene	ND	ND	ND	ND	ND	ND
Cumene	ND	ND	ND	ND	ND	ND
1,2,4 Trimethyl Benzene	ND	ND	ND	ND	ND	ND
P-cymene	ND	ND	ND	ND	ND	ND
Chlorobenzene	ND	ND	ND	ND	ND	ND
M-dichlorobenzene	ND	ND	ND	ND	ND	ND
O-dichlorobenzene	ND	ND	ND	ND	ND	ND ND
P-dichlorobenzene	ND	ND	ND	ND	ND	
Methyl Ethyl Ketone	ND	ND	ND	ND	ND	ND ND
Acetone	ND	ND	ND	ND	ND	ND ND
Bromodichloromethane	ND	ND	NĎ	ND	ND ND	ND
Bromoform	ND	ND	ND	ND	ND ND	ND ND
Carbon Tetrachloride	ND	ND	ND	ND ND	ND	ND
Dibromochloromethane	ND	ND	ND	ND ND	ND	ND
1, 2, Dichloroethane	ND	ND	ND ND	ND	ND	ND
Trans 1.2, Dichloroethane	ND	ND		ND	ND	ND
Trans 1, 2, Dichloroethylen	e ND	ND ND	ND ND	ND	ND	ND
1, 2, Dichloropropane	ND	ND ND	ND	ND	ND	ND
Cis 1, 3, Dichloropropane	ND ND	ND ND	ND	ND	ND	ND
Trans 1, 3, Dichloropropyle			ND	ND	ND	ND
1, 1, 2, 2, Tetrachloroethan		ND	ND	ND	ND	ND
1, 1, 2. Trichloroethane	ND	ND	ND ND	ND	ND	ND
2, Chloroethylvinyl Ether	ND	ND	MD	ND	Hν	110

Keytronic Corporation

T 4 310 04707 00					
Lab NO. 31797-88	(b) (6)	(b) (6)		
Name	() ()	Wahoo 🗋	, , ,		
		₩ell			
				40==0.0	00300.0
WELL NO.	1473C-3	1073 J-2	1573C-5	1073Q-3	02730-3
aaa Trifluorotoluene	IS	IS	IS	IS	IS
Chloroform	ND	ND	ND	ND	ND
1, 1, Dichloroethane	ND	ND	ND	4.0	ND
1, 1, Dichloroothylene	e ND	ND	ND	5	ND
Trichloroethylene	ND	ND	ND	ND	ND
1, 1, 1, Trichloroothas	ne ND	ND	ND	234	ND
Tetrachioroethylene	ND	ND	ND	ND	ND
Methylene Chloride	ND	ND	ND	ND	ND
1-Pentene	ND	ND	ND	ND	ND
Cyclopentane	ND	ND	ND	ND	ND
Trans 2 Hexene	ND	ND	ND	ND	ND
Benzene	ND	ND	ND	ND	ND
Toluene	ND	ND	ND	ND	ND
Ethylene DiBromide	ND	ND	ND	ND	ND ND
Ethly Benzene	NĎ	ND	ND	ND	
M-xylene	ND	ND	ND	ND	ND ND
0-xylene	ND	ND	ND	ND	ND ND
P-xylene	ND	ND	ND	ND	ND ND
Cumene	ND	ND	ND	ND ND	ND
1,2,4 Trimethyl Benzene	ND	ND	ND	ND ND	ND
P-cymene	ND	ND	ND	ND ND	ND
Chlorobenzene	ND	ND	ND ND	ND ND	ND
M-dichlorobenzene	ND	ND	ND ND	ND ND	ND
0-dichlorobenzene	ND	ND	ND ND	ND	ND
P-dichlorobenzene	ND	ND ND	ND	ND	ND
Methyl Ethyl Ketone	ND	ND ND	ND	ND	ND
Acetone	ND ND	ND	ND	ND	ND
Bromodichloromethane	ND ND	ND	ND	ND	ND
Bromoform	ND ND	ND	ND	NĎ	ND
Carbon Tetrachloride	ND ND	ND	ND	ND	ND
Dibromochloromethane	ND	ND	ND	ND	ND
1, 2, Dichloroethane		ND	ND	ND	ND
Trans 1.2, Dichloroethan		ND	ND	ND	ND
Trans 1, 2, Dichloroethyle 1, 2, Dichloropropane	ND ND	ND	ND	ND	ND
Cis 1, 3, Dichloropropane	ND	ND	ND	ND	ND
Trans 1, 3, Dichloropropy		ND	ND	ND	ND
1, 1, 2, 2, Tetrachloroetha	4 - 4 -	ND	ND	ND	ND
1, 1, 2, Trichloroethane	ND	ND	ND	ND	ND
2, Chloroethylvinyl Ethe		ND	ND	ND	ND
2, Office occurry is they i Line.	, ,,,,,	1112			_

Keytronic Corporation
Lab NO. 31797-88

	1 (b) (6)	2	3	4 (b) (6)	5
NANE	(-)(-)	Spike	Organic Free Spike	Spike	
aaa Trifluorotoluene Chloroform 1, 1, Dichloroethane 1, 1, Dichloroethylene Trichloroethylene 1, 1, 1, Trichloroethane		IS ND ND 11. ND 235	IS ND ND 8. ND 222.	IS ND ND 8. ND 234	IS ND ND 0.8 ND 11.0
Tetrachloroethylene Methylene Chloride	ND ND	ND ND	ND ND	ND ND	ND ND

Split samples with LAUCKS LABORATORIES. 7/28/88

Samples #2, #3 and #4 spiked with 10ppb 1,1,Dichloroethylene and 200ppb 1,1,1 Trichloroethane

Respectfully submitted.

ABC LABORATORIES, INC

W. E. Burkhardt

Manager

THE (b) (6) PUMP IS (N TOP WITH	THE (b) (6) _p	UMP BELO	W.	ent.			
	88 #31524-88		LAB	111-TCA	11-DCE	11-DCA	TCE	TETRACL	CHLOROFORM	
	OLLECTED 6/8/88	MORRIS								
) (6)	6-9-88	0273E-3	ABC	124	8	IID	HD	IID	ND	
	COLLECTED 6/16/	88 MORRIS								
) (6)	6-16-88	0273E-3	ABC	4	<1	110	ND	NĎ.	110	
	6-17-86	0273E-3	_ABC_	6	(1	. no	ND	HD	HD	
*****	**********	********	*****	******	******	*******	*****	******	******	
MPLES (COLLECTED 6/23/	88 MORRIS	- SPLI	T SAMPLE	AHALYZE	D BOTH L	AB3			
) (6)		F 0273E-3		23	2	DM	IID	ND	ND	
	6-24-88-	H 0273E-3	ABC	15	6	ND	ND	HD	OII	
	6-27-88-	F_0273E-3	WDOE	117	HD	ND	HD	OH.	ND	
		H 0273E-3		111	HD	ND	HO	ND	ND	
-COLLEC	CTED AT FAUCET	** H-COLLE	CTED F	ROM HOSE	1.					
MPLES_	COLLECTED 6/23/	88 MORRIS	- SPLI	T SAMPLE	ANALYZE	D BOTH L	ABS			
) (6)		0273E-3		87	4	JID	ND	110	NĎ	
		0273E-3		142	IID	HD	. ND	HD	ND	
		0273E-3		131	HD	HD	IID	HD	HD	
	88 #31598-88 COLLECTED 7/13/			1.1.1-TCA	11-DCE	11-DCA	TCE	TETRACL	CHLOROFORM	
) (6)		027 3 E-3		240	11	1	110	ND	11D	
	7-13-88	0273E-3	ABC	250	1.2	11	_ ND	ND	ND	
	1988 #31797-88						TCE	TETRACL	CHLOROFORM	
	7/26/88 SPLIT									
) (6)	7-28-88	0273E-3		11	.80	ND				
(6)	7-28-88 SPIKE	0273E-3 0273E-3		10	. <u>8</u> 11	IID			ND	
, (0)	7-28-88			235	1	HD			ND.	•
-	7-28-88 SPIKE FREE SPIKE ABO			222	8	IID IID			ND	
	TREE SPIKE ABO	02/35-3	ADC	222		110	111	0110	_011_	
	1988 #11133-rev D 7/26/88 SPLIT				1.1-DCE	11-DCA	TCE	TETRACL	CHLOROFORM	
) (6)	7-28-88	0273E-3		_	c1	<1_	<	1 <1	۲1	BROMODICHLOROMETHANE=1
, (-)	7-28-88	0273E-3		7	<1	<1	· ·		<1	CHLOROFORM=2; and
							<u>`</u>			1,1,2,2-TETRACHLOROETHANE
RGANIC F	REE SPIKE	0273E-3	LAUCKS	190	8	(1		<1		TITETE TE TRAUNLUKUE THANE
	COLLECTED 7/26/						SAMPLI	S, FURTH	HER EVIDENCE	THAT LOW WATER LEVELS

EXIST AND THAT THE TURBLANCE CAUSE BY THE PUMP ACTION MAY ACCOUNT FOR SOME OF THE VARIANCE. THIS SAMPLING WAS SENT TO TWO LABORATORIES FOR ANALYSIS. TWO OF THESE WERE SPIKED WITH 200 PPB OF 1,1,1,TCA AND 10 PPB OF 1,1,DCE WITH ANALYSIS AT ABC LABS, AND AN ORGANIC FREE SPIKE WATER SENT TO EACH LAB. THE RESULTS ABOVE WHICH ARE LABELED WITH THE WORD SPIKE SHOW THE ADDITION OF 111TCA AND 11DCE AT THE ABOVE CONCENTRATIONS TO THE COLLECTED SAMPLE.

Contaminant

Maximum Concentration parts per billion (ug/1)

Basis

PERFORMANCE STANDARDS

MAXIMUM ALLOWABLE CONTAMINANT CONCENTRATIONS

Health Protection Levels *

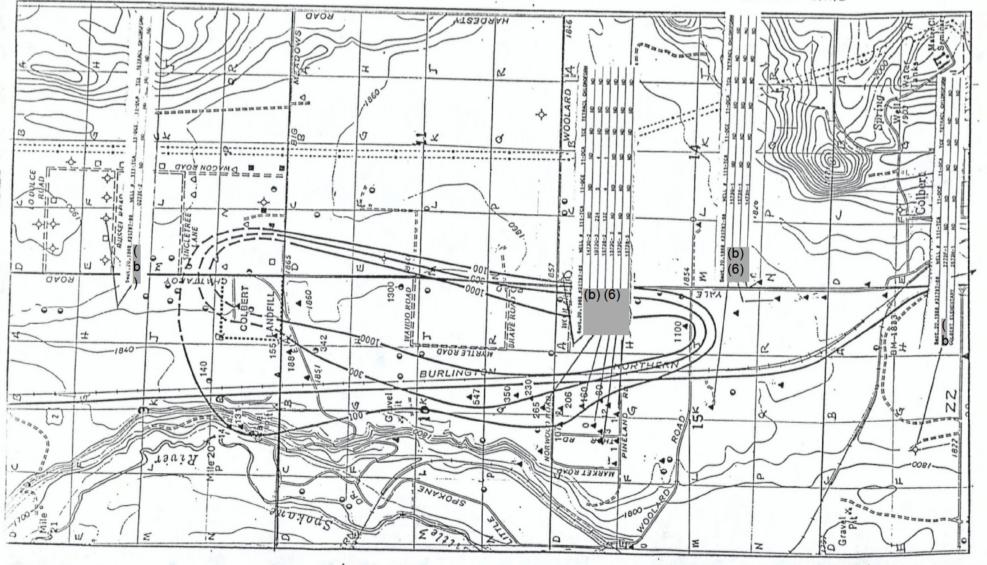
1,1,1-Trichloroethane (TCA) 1,1-Dichloroethylene (DCE) 1,1-Dichloroethane (DCA) Trichloroethylene (TCE) Tetrachloroethylene (PCE or TETRA Methylene Chloride (MC)	200.0 7.0 4050.0 5.0 CL) 0.7 2.5	MCL MCL MAC MCL 10 -6 cancer risk 10 -6 cancer risk
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* Health Protection Levels are not to be exceeded, during operational life of remedial action, in effluents from groundwater treatment systems. Permanent reduction of contaminant concentrations below these levels throughout the site will indicate completion of the remedial action.

SHALLOW AQUIFER MAP

A - SHALLOW OR UPPER SANDS AQUIFER

= WELL # GRID



PERFORMANCE STANDARDS

MAXIMUM ALLOWABLE CONTAMINANT CONCENTRATIONS

Health Protection Levels *

	Maximum Concentration					
ntaminant	parts per billion (ug/1)					

Basis

1,1,1-Trichloroethane (TCA)	200.0	MCL
1,1-Dichloroethylene (DCE)	7.0	MCL .
1,1-Dichloroethane (DCA)	4050.0	MAC
Trichloroethylene (TCE)	5.0	MCL
Tetrachloroethylene (PCE or TETRA CL	0.7	10 -6 cancer risk
Methylene Chloride (MC)	2.5	10 -6 cancer risk

Health Protection Levels are not to be exceeded, during operational life of remedial action, in effluents from groundwater treatment systems. Permanent reduction of contaminant concentrations below these levels throughout the site will indicate completion of the remedial action.

DEEP AQUIFER MAP

O - DEEP OR ASSOCIATED WITH DEEP AQUIFER = WELL # GRID

